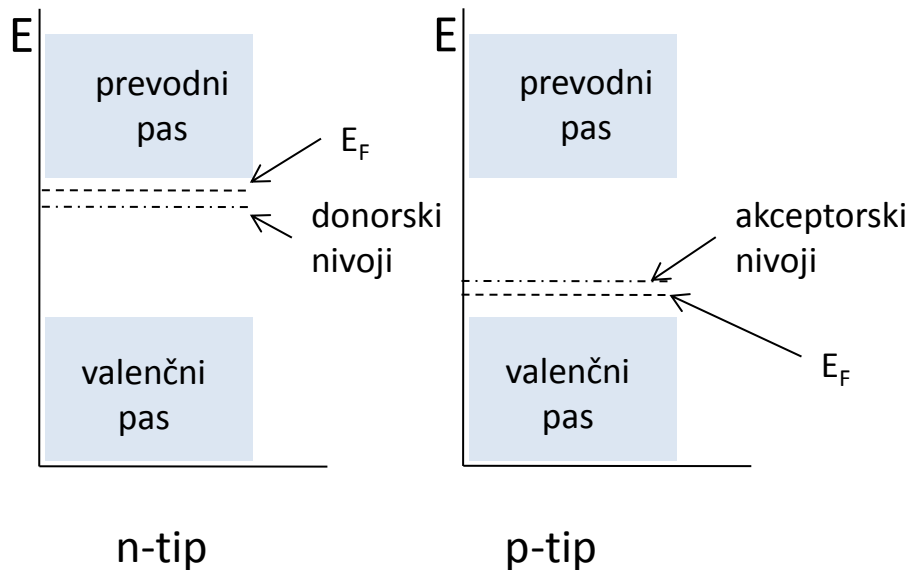
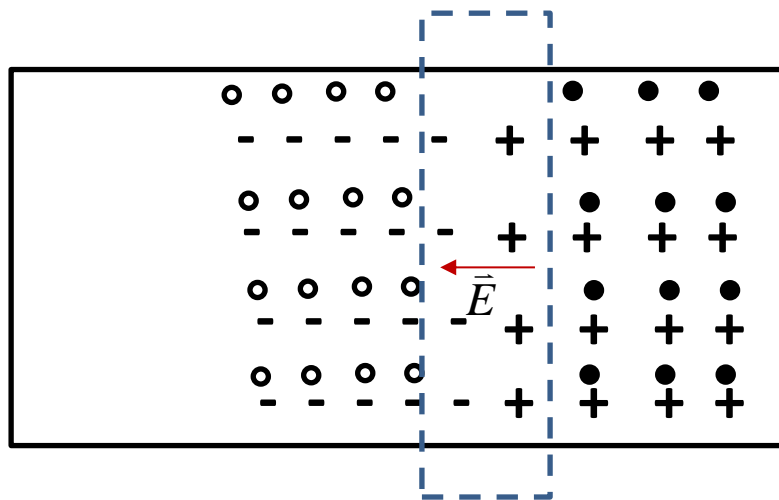


Dopiran polprevodnik



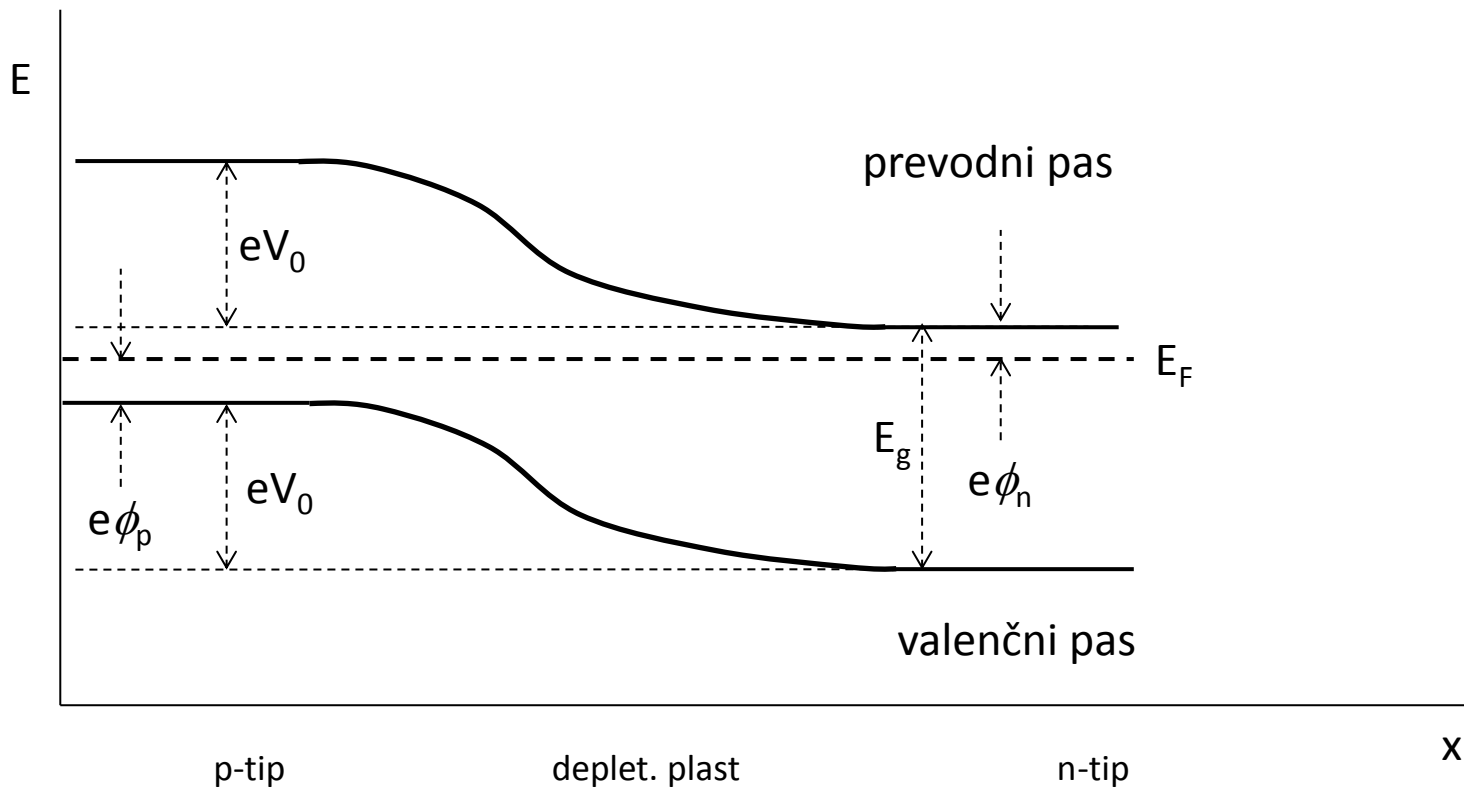
$$n_e n_v = n_i^2 = 4 \left(\frac{2\pi m k T}{h^2} \right)^3 e^{-E_g / kT}$$

p – n stik

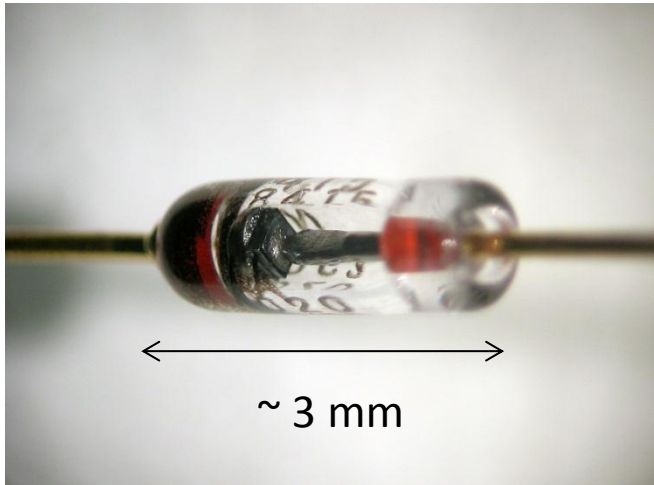


p-tip deplet. plast n-tip

- donorski atom s presežnim elek.
- akceptorski atom z vrzeljo
- depletirana plast



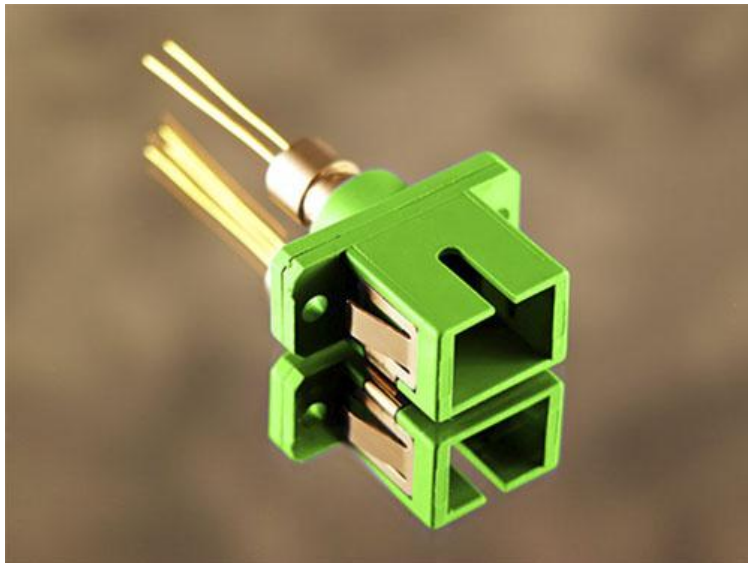
$$e\phi_n + V_0 - E_g + e\phi_p = 0$$



polprevodniška dioda



LED = Light Emitting Diode;
dioda z napetostjo v prevodni smeri



Fotodioda
dioda z napetostjo v zaporni smeri